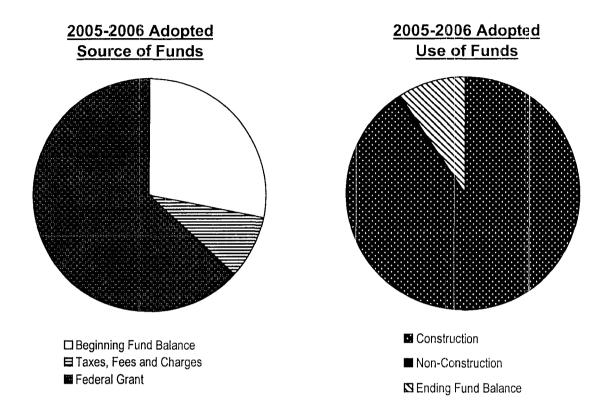
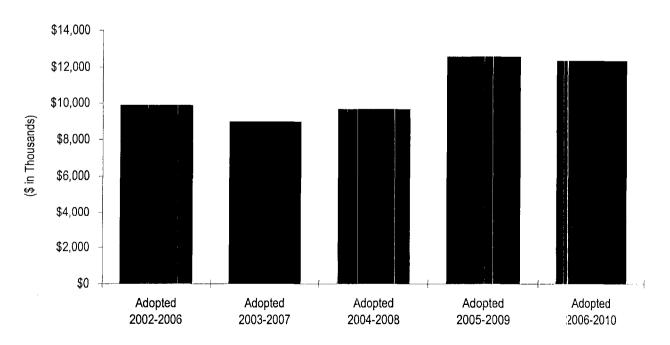
COMMUNICATIONS CAPITAL PROGRAM 2006-2010 Capital Improvement Program



CIP History



2006-2010 Adopted Capital Improvement Program

Overview

Introduction

In October 1990, the City assumed the responsibility of providing its own emergency communications service for police and fire from the County of Santa Clara. Communications Capital Improvement Program (CIP) was set up to address the replacement and upgrade of both the public safety and non-public safety radio equipment. The inventory of equipment that is supported by this program consists of approximately 25 fixed-equipment sites, 100 base stations, 980 mobile radios and 1,940 portable radios. Approximately 78% of this equipment is critical to the delivery of public safety The 2006-2010 Adopted CIP provides funding of \$12.4 million, of which \$7.6 million is allocated in 2005-2006.

This program is part of the Strategic Support City Service Area (CSA) and supports the following outcomes from that CSA: Safe and Functional Public Infrastructure, Facilities, Materials and Equipment; and Effective Use of State-of-the-Art Technology. In addition to two outcomes in the Strategic Support CSA, the program supports one outcome in the Public Safety CSA: The Public Feels Safe Anywhere, Anytime in San José.

Program Priorities and Objectives

The Communications CIP's guiding objective is the provision of reliable, necessary public and non-public safety-related communications equipment for all City employees who need this equipment for their jobs.

Based on the CSA outcomes supported by this program, the following list of priorities has been developed:

- Proactively replace public safetyrelated communications equipment and systems to ensure reliability and optimal performance, and compliance with rules of the Federal Communications Commission;
- Defer replacement of additional equipment for non-public safety systems in order to focus on essential police and fire communications;
- Maintain existing radio equipment in a proactive manner to ensure optimal functionality and to extend the length of service; and
- Strategically plan for future major upgrades and technology changes.

Almost the entire Communications CIP is allocated to equipment replacement and upgrades, which support each of the four priorities. This allocation provides funding to replace communications equipment over the next five years after careful study and The life of the City's current planning. equipment has been expanded as a result of a proactive maintenance schedule. equipment, nevertheless, will eventually outlive its useful life and the costs of repairing outmoded equipment in some cases have begun to overtake the costs of replacing it.

The City of San José is the lead agency in a microwave radio network project, called "E-COMM", with 75% funding via a Community Oriented Policing Services (COPS) Federal Grant. This project, currently in the final design stages, will allow for the replacement of the City of San José's existing analog microwave network, and also

2006-2010 Adopted Capital Improvement Program

Overview

Program Priorities and Objectives (Cont'd.)

allow direct connectivity to and from all other 9-1-1 dispatch centers within the County of Santa Clara Operational Area.

In 2007-2008, the replacement of over 400 radio modems and base stations that provide a wireless mobile data connectivity network for public safety vehicles is planned. Evaluation and testing of new technology solutions for secure wireless data services have begun. Part of this process will be to identify potential cost effective alternatives that can continue to provide the same level of reliable mobile data services that are now offered, with an integration of additional wireless technology.

As economic factors continue to impact the General Fund, prioritization of operation and maintenance support for police and fire systems has reduced response for non-public safety systems.

Sources of Funding

Revenue for the 2006-2010 Adopted CIP is primarily fromtwo sources: Construction and Conveyance (C&C) Tax and General Fund. The Communications CIP receives 3.40% of the City's C&C Tax. Approximately 98% of this tax is derived from a transfer tax imposed upon each transfer of real property with the remaining 2% generated from a construction tax levied on most types of construction. For the 2006-2010 Adopted CIP, it is assumed that collections allocated to the Communications Capital Program will fall to \$680,000 in 2005-2006 and 2006-2007 (from the current year estimate of \$1,292,000) and will level off at \$612,000 annually for each of the remaining years of the CIP. These estimates are based on the theory that the current level of activity in the housing market (which generates this revenue) is unusually high and is not sustainable over an extended period of time. Therefore, the C&C estimates reflected in the 2006-2010 Adopted CIP assume collections will finally begin reflecting the reality of local economic conditions.

As discussed in previous CIP documents, the projected C&C Tax funds will be insufficient during the next five-year period to fully address the programmed costs of ensuring that city-wide communications equipment is functional and modern enough to deliver reliable service to public safety officers and staff who are serving citizens. A number of strategies to close the funding gap are being pursued, including police grant opportunities, public safety partnerships, and Homeland Defense programs to minimize impacts on the General Fund.

Program Highlights

Communications Equipment Replacement & Upgrade

As already highlighted, a majority of the Communications Capital Program budget is dedicated to equipment replacement and upgrade. These funds keep the City's communications sites, base stations, and approximately 5,500 mobile radios, portable radios, and mobile data systems functioning and up-to-date. The core radio equipment system was installed in 1990 and has an estimated 10-year life cycle for public safety equipment and 15-year life cycle for non-

2006-2010 Adopted Capital Improvement Program

Overview

Program Highlights (Cont'd.)

Communications Equipment Replacement & Upgrade (Cont'd.)

public safety equipment. Both public safety and non-public safety customers will benefit from this replacement.

Fire Dispatch Channel Expansion

The Fire Dispatch Channel Expansion project will continue the search for two new frequencies to convert the dispatch channel from a simplex system to a repeater system and add another Command 2 channel for "on-scene" coordination. This project was deferred in 2003-2004 due to the inability to locate frequencies. However, the Fire Department may choose to release an existing frequency for this project. If a frequency were released, this project would continue to search for an additional frequency.

Police Dispatch Voting Receivers

This five-year project, started in 2004-2005, will install additional police voting receivers. A voting receiver is a device that receives voice transmissions and sends them to the 9-1-1 center. By installing additional voting receivers, existing radio sites will begin to increase radio coverage across adjoining districts police as well as enhance communication reliability between police officers and dispatchers.

Major Changes from the 2005-2009 Adopted CIP:

• A General Fund contribution of \$1,072,000, previously forecasted as

2005-2006 for the necessary in Communications Equipment Replacement & Upgrade project, has proven to be unnecessary and has been eliminated. Funding for this program is primarily used to support the replacement of communications equipment, including the construction of a tower, if needed, for the microwave upgrade in 2005-2006. The estimated cost of the tower has been reduced from \$1,100,000 to \$200,000 as a reassessing result of needs determining less expensive alternatives. As a result of savings associated with the tower and higher than anticipated C&C revenues, supplemental funding from the General Fund in 2005-2006 is therefore no longer necessary.

- part the Communications Equipment Replacement & Upgrade Program, the radio dispatch consoles in the City's 9-1-1 dispatch center will be replaced. These consoles have been in service since 1990, and were due for replacement in 2000-2001. The project was deferred due to the favorable repair history and the need to prioritize the Police Department's radio replacements. Beginning in December 2005, equipment will no longer be supported by the vendor. Consequently, replacement of radio dispatch consoles programmed for 2005-2006.
- Beginning in 2005-2006, the General Services Department will assume responsibility from the Information Technology Department for the Communications Capital Program. This shift will better align work in the capital program with service delivery.

2006-2010 Adopted Capital Improvement Program

Overview

Operating Budget Impact

One project in the 2006-2010 Adopted CIP will have an impact on the operating budget, which is supported by the General Fund. The Police Dispatch Voting Receivers project will require operating costs for lease agreements to support telephone lines and receivers. The

following table shows the current estimated impact of this project. All projects anticipated to be operational in 2005-2006 have been addressed in the 2005-2006 Adopted Operating Budget. Additional details on individual projects with operating budget impacts are provided in the Project Detail Pages.

Net Operating Budget Impact Summary

	2006-2007	2007-2008	2008-2009	<u>2009-2010</u>
Police Dispatch Voting Receivers	\$ 31,000	\$ 31,000	\$ 31,000	\$ 31,000
Total	\$ 31,000	\$ 31,000	\$ 31,000	\$ 31,000

Note: The estimated operating costs have been provided by the Information Technology Department and have not yet been fully analyzed by the Budget Office. That analysis may well result in different costs when the actual budget for the year in question is formulated.

Council-Approved Revisions to the Proposed Capital Improvement Program

During the June budget hearings, the City Council approved the rebudgeting of unexpended funds totaling \$5,276,348 in the Communications Capital Program for the following projects: COPS 2003-2004 Interoperable Communications Grant

(\$4,818,348), Communications Equipment Replacement & Upgrade (\$376,000), Fire Dispatch Channel Expansion (\$3,000), and Police Dispatch Voting Receivers (\$79,000). In addition, an upward adjustment to the 2005-2006 Beginning Fund Balance of \$408,000 was made to reflect higher than anticipated C&C revenues in 2004-2005.

2005-2006 CAPITAL BUDGET

2006-2010 CAPITAL IMPROVEMENT PROGRAM

COMMUNICATIONS

Source of Funds

Use of Funds

The Source of Funds displays the capital revenues by funding source for each year of the Five-Year Capital Improvement Program. The Use of Funds displays the capital expenditures by line-item for each year of the five-year period.

2006-2010 Adopted Capital Improvement Program Source of Funds

SOURCE OF FUNDS	Estimated 2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010	5-Year Total
General Fund							
Contributions, Loans and Transfers from: General Fund							
 COPS 2003-2004 Interoperable Communications Grant Communications Equipment Replacement and Upgrade 		4,818,348		1,240,000	488,000	488,000	4,818,348 2,216,000
 Interoperable Communications Radio Grant 	581,000						
Total General Fund	581,000	4,818,348	······································	1,240,000	488,000	488,000	7,034,348
Communications Construction & Conveyance Tax Fund							
Beginning Fund Balance Taxes, Fees & Charges:	1,773,292	2,139,655	700,655	701,655	408,655	408,655	2,139,655 *
Construction and Conveyance Tax Reserve for Encumbrances	1,292,000 280,363	680,000	680,000	612,000	612,000	612,000	3,196,000
Total Communications Construction & Conveyance Tax Fund	3,345,655	2,819,655	1,380,655	1,313,655	1,020,655	1,020,655	5,335,655 *
TOTAL SOURCE OF FUNDS	3,926,655	7,638,003	1,380,655	2,553,655	1,508,655	1,508,655	12,370,003 *

^{*} The 2006-2007 through 2009-2010 Beginning Balances are excluded from the FIVE-YEAR TOTAL SOURCE OF FUNDS to avoid multiple counting of the same funds.

2006-2010 Adopted Capital Improvement Program

Use of Funds

USE OF FUNDS	Estimated 2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010	5-Year Total
Construction Projects							
Edenvale Radio Site	12,000						
Interoperable Communications Radio Grant	581,000						
Public Safety Mobile Computers 1. COPS 2003-2004 Interoperable Communications Grant	13,000	4,818,348					4,818,348
2. Communications Equipment	964,000	1,736,000	495,000	1,961,000	916,000	1,100,000	6,208,000
Replacement and Upgrade 3. Fire Dispatch Channel Expansion		70,000					70,000
Police Dispatch Voting Receivers	105,000	263,000	184,000	184,000	184,000		815,000
Total Construction Projects	1,675,000	6,887,348	679,000	2,145,000	1,100,000	1,100,000	11,911,348
Non-Construction							
General Non-Construction							
Budget Office Capital Program Staff	32,000						
CIP Action Team	23,000						
Information Technology Staff	15,000						
 Feasibility Study for Hidalgo Radio Site 		50,000					50,000
Total General Non-Construction	70,000	50,000					50,000

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Communications Capital Program

2006-2010 Adopted Capital Improvement Program

Use of Funds

	Estimated						5-Year
USE OF FUNDS (CONT'D.)	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010	Total
Non-Construction							
Contributions, Loans and Transfe	ers to Capital Fu	nds					
Transfer to Fund 392 for Fire Dispatch Channel Expansion	42,000						
Total Contributions, Loans and Transfers to Capital Funds	42,000						
Total Non-Construction	112,000	50,000					50,000
Ending Fund Balance	2,139,655	700,655	701,655	408,655	408,655	408,655	408,655*
TOTAL USE OF FUNDS	3,926,655	7,638,003	1,380,655	2,553,655	1,508,655	1,508,655	12,370,003*

^{*} The 2005-2006 through 2008-2009 Ending Balances are excluded from the FIVE-YEAR TOTAL USE OF FUNDS to avoid multiple counting of same funds.

2006-2010 Adopted Capital Improvement Program

2005-2006 Use of Funds by Funding Source

	(001)	(397)	Total	
	General Fund	Communications Construction & Conveyance Tax Fund		
TOTAL RESOURCES	4,818,348	2,819,655	7,638,003	
Construction Projects				
COPS 2003-2004 Interoperable Communications Grant	4,818,348		4,818,348	
Communications Equipment Replacement and Upgrade		1,736,000	1,736,000	
3. Fire Dispatch Channel Expansion		70,000	70,000	
4. Police Dispatch Voting Receivers		263,000	263,000	
Total Construction Projects Non-Construction	4,818,348	2,069,000	6,887,348	
General Non-Construction 5. Feasibility Study for Hidalgo Radio Site		50,000	50,000	
Total General Non-Construction		50,000	50,000	
Total Non-Construction		50,000	50,000	
Ending Fund Balance		700,655	700,655	
TOTAL USE OF FUNDS	4,818,348	2,819,655	7,638,003	
=				

2005-2006 CAPITAL BUDGET

2006-2010 CAPITAL IMPROVEMENT PROGRAM

COMMUNICATIONS

DETAIL OF

CAPITAL PROJECTS

The Detail of Capital Projects section provides information on the individual capital projects with funding in 2005-2006, including the following: project name, City Service Area (CSA) and CSA Outcome supported by the project, responsible department, Council District, project location, project description, project start and completion dates, project justification, project costs by type of expenditure, funding sources for the project, and the annual operating budget impact. On the Use of Funds statement, these projects are numbered.

2006-2010 Adopted Capital Improvement Program **Detail of Capital Projects**

1. COPS 2003-2004 Interoperable Communications Grant

CSA:

Strategic Support

Initial Start Date: 4th Qtr. 2004

CSA Outcome:

Effective Use of State-of-the-Art Technology

Revised Start Date:

Department:

General Services

Initial Completion Date: 4th Qtr. 2005

Council District:

City-wide

Revised Completion Date:

Location:

City-wide

Description:

This project includes upgrading the microwave network for the City of San José and Santa Clara

County and establishing microwave links in North, South and West areas of Santa Clara County to

provide complete communications coverage.

Justification:

The ability to provide services to the City and County require the upgrade of the City's communication equipment. San José, in conjunction with the Silicon Valley Regional Interoperability Project Group (SVRIP), prepared a grant application which demonstrated how the funding will help all agencies in the Santa Clara County region achieve interoperability among the fire service, law enforcement and emergency medical service communities. The grant will reduce the reliance on the

General Fund for the costs of the upgrade and replacement.

		EXPENDITURE SCHEDULE (000'S)										
Cost Elements		2004-05 Appn.	2004-05 Estimate	2005-06	2006-07	2007-08	2008-09	2009-10	Total	Beyond 5-Year	Project Total	
Equipment	1400	4,818		4,818					4,818		4,818	
TOTAL		4,818		4,818					4,818		4,818	
			FUN	DING SO	URCE SC	HEDULE ((000'S)				:	
General Fund		4,818		4,818					4,818		4,818	
TOTAL		4,818		4,818					4,818		4,818	

ANNUAL OPERATING BUDGET IMPACT (000'S)

None

Major Changes in Project Cost:

None

Notes:

In 2003-2004, this grant was included in the City-wide Operating Budget.

FY Initiated:

2003-2004

Redevelopment Area:

N/A

Initial Project Budget:

\$4,818,000

SNI Area:

N/A

Appn. #:

2006-2010 Adopted Capital Improvement Program Detail of Capital Projects

2. Communications Equipment Replacement and Upgrade

CSA:

Strategic Support

Initial Start Date:

Ongoing

CSA Outcome:

Effective Use of State-of-the-Art Technology

Revised Start Date:

Department:

General Services

Initial Completion Date:

Ongoing

Council District:

-

Revised Completion Date:

Location:

City-wide City-wide

Description:

This allocation provides for the replacement of communications equipment based upon useful life expectancy. In 2005-2006, funding is programmed for the replacement of consoles in the 9-1-1 dispatch center and the construction of a tower for the microwave network upgrade, if needed. In addition, funding is allocated for the replacement of extensive fixed point (base station) radio equipment at 13 sites and replacement of over 400 radio modems and base stations that provide the

radio data network for Public Safety vehicles in 2007-2008.

Justification:

This allocation funds essential communications equipment for Police, Fire, and non-public safety city

operations.

	EXPENDITURE SCHEDULE (000'S)									-	
Cost Elements	Prior Years	2004-05 Appn.	2004-05 Estimate	2005-06	2006-07	2007-08	2008-09	2009-10	5-Year Total	Beyond 5-Year	Project Total
Equipment		1,340	964	1,736	495	1,961	916	1,100	6,208		
TOTAL		1,340	964	1,736	495	1,961	916	1,100	6,208		
			FUN	IDING SO	URCE SC	HEDULE ((000'S)				
General Fund Communications Construction & Conveyance Tax Fund		1,340	964	1,736	495	1,240 721	488 428	488 612	2,216 3,992		
TOTAL		1,340	964	1,736	495	1,961	916	1,100	6,208		

ANNUAL OPERATING BUDGET IMPACT (000'S)

None

Major Changes in Project Cost:

N/A

Notes:

Project schedule dates and selected budget information are not provided due to the ongoing nature of this project.

FY Initiated:

Ongoing

Redevelopment Area:

N/A

Initial Project Budget:

SNI Area:

N/A

Appn. #:

2006-2010 Adopted Capital Improvement Program **Detail of Capital Projects**

3. Fire Dispatch Channel Expansion

CSA:

Strategic Support

Initial Start Date: 3rd Qtr. 2003

CSA Outcome:

Effective Use of State-of-the-Art Technology

Revised Start Date:

Department:

General Services

Initial Completion Date: 2nd Qtr. 2004

Council District:

City-wide

Revised Completion Date: 2nd Qtr. 2006

Location:

Description:

City-wide

This project will move fire dispatch operations to a new radio frequency and enhance radio coverage

within the City.

Justification:

This project addresses radio interference to the City from north bay fire agencies. Funding for this project utilizes funds from cancelled feasibility studies and a transfer from the Fire Construction and

Conveyance Tax Fund in a prior fiscal year for the replacement and build out costs of this project.

	EXPENDITURE SCHEDULE (000'S)											
Cost Elements	 2004-05 Appn.	2004-05 Estimate		2006-07	2007-08	2008-09	2009-10	5-Year Total	Beyond 5-Year	Project Total		
Equipment	1 3		70					70		71		
TOTAL	1 3		70					70		71		
		FUN	NDING SO	URCE SC	HEDULE ((000'S)						
Communications Construction & Conveyance Tax Fund	1 3		70					70		71		
TOTAL	1 3		70					70		71		
		ANNUA	AL OPERA	TING BUE	GET IMP	ACT (000'	S)					
None	 											

Major Changes in Project Cost:

2005-2009 CIP: The project costs have decreased due to revised estimates that include the lower probability of locating two frequencies.

Notes:

FY Initiated:

2003-2004

Redevelopment Area:

N/A

Initial Project Budget:

\$113,000

SNI Area:

N/A

Appn. #:

2006-2010 Adopted Capital Improvement Program Detail of Capital Projects

4. Police Dispatch Voting Receivers

CSA:

Strategic Support

Initial Start Date: 3rd Qtr. 2004

CSA Outcome:

Effective Use of State-of-the-Art Technology

Revised Start Date:

Department:

General Services

Initial Completion Date: 2nd Qtr. 2009

Council District:

City-wide

Revised Completion Date:

Location:

City-wide

Description:

This is a multi-year project to install additional police voting receivers (devices that receive voice

transmissions and send them to the 9-1-1 center) and upgrade signal conditioning devices at existing

radio sites. This project will increase radio coverage across adjoining police districts.

Justification:

This project will improve public safety communications.

				XPENDIT	URE SCH	EDULE (0	00'S)				
Cost Elements	Prior Years	2004-05 Appn.	2004-05 Estimate	2005-06	2006-07	2007-08	2008-09	2009-10	5-Year Total	Beyond 5-Year	Project Total
Equipment		184	105	263	184	184	184		815		920
TOTAL		184	105	263	184	184	184		815		920
		_	FUN	IDING SO	URCE SC	HEDULE ((000'S)				
Communications Construction & Conveyance Tax Fund		184	105	263	184	184	184		815		920
TOTAL		184	105	263	184	184	184		815		920
			ANNUA	L OPERA	TING BUI	GET IMP	ACT (000'	S)	_		
Operating		·		· ·	31	31	31	31			
TOTAL					31	31	31	31			

Major Changes in Project Cost:

None

Notes:

FY Initiated:

2004-2005

Redevelopment Area:

N/A

Initial Project Budget:

\$920,000

SNI Area:

N/A

Appn. #:

2006-2010 Adopted Capital Improvement Program Detail of Capital Projects

5. Feasibility Study for Hidalgo Radio Site

CSA:

Strategic Support

Initial Start Date: 3rd Qtr. 2004

CSA Outcome:

Effective Use of State-of-the-Art Technology

Revised Start Date:

Department:

General Services

Initial Completion Date: 2nd Qtr. 2005

Council District:

City-wide

Initial Completion Date: 2nd Qtr. 2005

Location:

City-wide

Revised Completion Date: 2nd Qtr. 2006

City-wide

Description:

This allocation provides funding to study the feasibility of placing a radio site in or around the

southern San Felipe Road area.

Justification:

This study analyzes the current communication strategy for the City's 9-1-1 Dispatch Center in new

development areas along southern San Felipe Road, including the Villages.

	T.			XPENDIT	URE'SCH	EDULE (0	00'S)				
Cost Elements	Prior Years	2004-05 Appn.	2004-05 Estimate	2005-06	2006-07	2007-08	2008-09	2009-10	5-Year Total	Beyond 5-Year	Project Total
Master Plan/Study		50		50					50		50
TOTAL		50		50					50		50
			FUN	IDING SO	URCE SC	HEDULE (000'S)				
Communications Construction & Conveyance Tax Fund		50		50					50		50
TOTAL		50		50					50		50
		İ	ANNUA	L OPERA	TING BUE	GET IMP	ACT (000'	S)			:

None

Major Changes in Project Cost:

None

Notes:

FY Initiated:

2004-2005

Redevelopment Area:

N/A

Initial Project Budget:

\$50,000

SNI Area:

N/A

Appn. #: